

**Figure 15** Comparison between experimental (symbols) shock tube ignition delay data as investigated by Natarajan and Bhaskaran [2] and the numerical calculations (solid and dashed lines) using the chemical kinetic model. Experimental conditions: 4.0% C<sub>2</sub>H<sub>5</sub>OH, 6.0% O<sub>2</sub>, and 90% Argon (equivalence ratio = 2.0), and  $1.0 \pm 0.2$  and  $2.0 \pm 0.2$  atm.